$$O_{\mathbf{h}} = \frac{1}{n} \sum_{i=1}^{n} X_{i}$$
 (Eq. 8)

Where:

 X_1 = the PM CPMS data points for all runs i, n = the number of data points, and

 $O_{\rm h}$ = your site specific operating limit, in milliamps.

(4) To determine continuous compliance, you must record the PM CPMS output data for all periods when the process is operating and the PM CPMS is not out-of-control. You must demonstrate continuous compliance by using all quality-assured hourly average data collected by the PM CPMS for all operating hours to calculate the arithmetic average operating parameter in units of the operating limit (e.g., milliamps, PM concentration, raw data signal) on a 30-day rolling average basis.

(5) For PM performance test reports used to set a PM CPMS operating limit, the electronic submission of the test report must also include the make and model of the PM CPMS instrument, serial number of the instrument, analytical principle of the instrument (e.g., beta attenuation), span of the instruments primary analytical range, milliamp value equivalent to the instrument zero output, technique by which this zero value was determined, and the average milliamp signals corresponding to each PM compliance test run.

[65 FR 75362, Dec. 1, 2000, as amended at 76 FR 15771, Mar. 21, 2011; 78 FR 9196, Feb. 7, 2013]

§ 60.2680 What if I do not use a wet scrubber, fabric filter, activated carbon injection, selective noncatalytic reduction, an electrostatic precipitator, or a dry scrubber to comply with the emission limitations?

(a) If you use an air pollution control device other than a wet scrubber, activated carbon injection, selective noncatalytic reduction, fabric filter, an electrostatic precipitator, or a dry scrubber or limit emissions in some other manner, including mass balances, to comply with the emission limitations under §60.2670, you must petition

the EPA Administrator for specific operating limits to be established during the initial performance test and continuously monitored thereafter. You must submit the petition at least sixty days before the performance test is scheduled to begin. Your petition must include the five items listed in paragraphs (a)(1) through (5) of this section.

- (1) Identification of the specific parameters you propose to use as additional operating limits.
- (2) A discussion of the relationship between these parameters and emissions of regulated pollutants, identifying how emissions of regulated pollutants change with changes in these parameters and how limits on these parameters will serve to limit emissions of regulated pollutants.
- (3) A discussion of how you will establish the upper and/or lower values for these parameters which will establish the operating limits on these parameters.
- (4) A discussion identifying the methods you will use to measure and the instruments you will use to monitor these parameters, as well as the relative accuracy and precision of these methods and instruments.
- (5) A discussion identifying the frequency and methods for recalibrating the instruments you will use for monitoring these parameters.
- (b) [Reserved]

[76 FR 15772, Mar. 21, 2011, as amended at 78 FR 9197, Feb. 7, 2013]

§ 60.2685 Affirmative defense for violation of emission standards during malfunction.

In response to an action to enforce the standards set forth in paragraph §60.2670 you may assert an affirmative defense to a claim for civil penalties for violations of such standards that are caused by malfunction, as defined at 40 CFR 60.2. Appropriate penalties may be assessed if you fail to meet your burden of proving all of the requirements in the affirmative defense. The affirmative defense shall not be

Environmental Protection Agency

available for claims for injunctive relief.

- (a) Assertion of affirmative defense. To establish the affirmative defense in any action to enforce such a standard, you must timely meet the reporting requirements in paragraph (b) of this section, and must prove by a preponderance of evidence that:
 - (1) The violation:
- (i) Was caused by a sudden, infrequent, and unavoidable failure of air pollution control equipment, process equipment, or a process to operate in a normal or usual manner; and
- (ii) Could not have been prevented through careful planning, proper design or better operation and maintenance practices; and
- (iii) Did not stem from any activity or event that could have been foreseen and avoided, or planned for; and
- (iv) Was not part of a recurring pattern indicative of inadequate design, operation, or maintenance; and
- (2) Repairs were made as expeditiously as possible when a violation occurred. Off-shift and overtime labor were used, to the extent practicable to make these repairs; and
- (3) The frequency, amount and duration of the violation (including any bypass) were minimized to the maximum extent practicable; and
- (4) If the violation resulted from a bypass of control equipment or a process, then the bypass was unavoidable to prevent loss of life, personal injury, or severe property damage; and
- (5) All possible steps were taken to minimize the impact of the violation on ambient air quality, the environment, and human health; and
- (6) All emissions monitoring and control systems were kept in operation if at all possible, consistent with safety and good air pollution control practices; and
- (7) All of the actions in response to the violation were documented by properly signed, contemporaneous operating logs; and
- (8) At all times, the affected CISWI unit was operated in a manner consistent with good practices for minimizing emissions; and
- (9) A written root cause analysis has been prepared, the purpose of which is to determine, correct, and eliminate

the primary causes of the malfunction and the violation resulting from the malfunction event at issue. The analysis shall also specify, using best monitoring methods and engineering judgment, the amount of any emissions that were the result of the malfunction.

(b) Report. The owner or operator seeking to assert an affirmative defense shall submit a written report to the Administrator with all necessary supporting documentation, that it has met the requirements set forth in paragraph (a) of this section. This affirmative defense report shall be included in the first periodic compliance, deviation report or excess emission report otherwise required after the initial occurrence of the violation of the relevant standard (which may be the end of any applicable averaging period). If such compliance, deviation report or excess emission report is due less than 45 days after the initial occurrence of the violation, the affirmative defense report may be included in the second compliance, deviation report or excess emission report due after the initial occurrence of the violation of the relevant standard.

[78 FR 9197, Feb. 7, 2013]

MODEL RULE—PERFORMANCE TESTING

§ 60.2690 How do I conduct the initial and annual performance test?

- (a) All performance tests must consist of a minimum of three test runs conducted under conditions representative of normal operations.
- (b) You must document that the waste burned during the performance test is representative of the waste burned under normal operating conditions by maintaining a log of the quantity of waste burned (as required in §60.2740(b)(1)) and the types of waste burned during the performance test.
- (c) All performance tests must be conducted using the minimum run duration specified in tables 2 and 6 through 9 of this subpart.
- (d) Method 1 of appendix A of this part must be used to select the sampling location and number of traverse points.